MICHIGAN DEPARTMENT OF ENVIRONMENTAL QUALITY AIR QUALITY DIVISION

March 23, 2015

PERMIT TO INSTALL 22-09B

ISSUED TO

DW-National Standard-Niles LLC

LOCATED AT 1631 Lake Street Niles, Michigan

IN THE COUNTY OF Berrien

PENINSTILA

STATE REGISTRATION NUMBER B5417

The Air Quality Division has approved this Permit to Install, pursuant to the delegation of authority from the Michigan Department of Environmental Quality. This permit is hereby issued in accordance with and subject to Section 5505(1) of Article II, Chapter I, Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended. Pursuant to Air Pollution Control Rule 336.1201(1), this permit constitutes the permittee's authority to install the identified emission unit(s) in accordance with all administrative rules of the Department and the attached conditions. Operation of the emission unit(s) identified in this Permit to Install is allowed pursuant to Rule 336.1201(6).

March 18, 2015	DATE OF RECEIPT OF ALL INFORMATION REQUIRED BY RULE 203: March 18, 2015			
DATE PERMIT TO INSTALL APPROVED: March 23, 2015	SIGNATURE:			
DATE PERMIT VOIDED:	SIGNATURE:			
DATE PERMIT REVOKED:	SIGNATURE:			

PERMIT TO INSTALL

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Common Abbreviations / Acronyms

	Common Acronyms		collutant / Measurement Abbreviations
AQD	Air Quality Division	BTU	British Thermal Unit
BACT	Best Available Control Technology	°C	Degrees Celsius
CAA	Clean Air Act	co	Carbon Monoxide
CEM	Continuous Emission Monitoring	dscf	Dry standard cubic foot
CFR	Code of Federal Regulations	dscm	Dry standard cubic meter
CO ₂ e	Carbon Dioxide Equivalent	°F	Degrees Fahrenheit
COM	Continuous Opacity Monitoring	gr	Grains
EPA	Environmental Protection Agency	Hg	Mercury
EU	Emission Unit	hr	Hour
FG	Flexible Group	H ₂ S	Hydrogen Sulfide
GACS	Gallon of Applied Coating Solids	hp	Horsepower
GC	General Condition	lb	Pound
GHGs	Greenhouse Gases	kW	Kilowatt
HAP	Hazardous Air Pollutant	m	Meter
HVLP	High Volume Low Pressure *	mg	Milligram
ID	Identification	mm	Millimeter
LAER	Lowest Achievable Emission Rate	MM	Million
MACT	Maximum Achievable Control Technology	MW	Megawatts
MAERS	Michigan Air Emissions Reporting System	ng	Nanogram
MAP	Malfunction Abatement Plan	NO _x	Oxides of Nitrogen
MDEQ	Michigan Department of Environmental Quality (Department)	PM	Particulate Matter
MSDS	Material Safety Data Sheet	PM10	PM with aerodynamic diameter ≤10 microns
NESHAP	National Emission Standard for Hazardous Air Pollutants	PM2.5	PM with aerodynamic diameter ≤ 2.5 microns
NSPS	New Source Performance Standards	pph	Pounds per hour
NSR	New Source Review	ppm	Parts per million
PS	Performance Specification	ppmv	Parts per million by volume
PSD	Prevention of Significant Deterioration	ppmw	Parts per million by weight
PTE	Permanent Total Enclosure	psia	Pounds per square inch absolute
PTI	Permit to Install	psig	Pounds per square inch gauge
RACT	Reasonably Available Control Technology	scf	Standard cubic feet
ROP	Renewable Operating Permit	sec	Seconds
SC	Special Condition	SO ₂	Sulfur Dioxide
SCR	Selective Catalytic Reduction	THC	Total Hydrocarbons
SRN	State Registration Number	tpy	Tons per year
TAC	Toxic Air Contaminant	μg	Microgram
TEQ	Toxicity Equivalence Quotient	VOC	Volatile Organic Compound
VE	Visible Emissions	yr	Year

^{*} For High Volume Low Pressure (HVLP) applicators, the pressure measured at the HVLP gun air cap shall not exceed ten (10) pounds per square inch gauge (psig).

GENERAL CONDITIONS

- 1. The process or process equipment covered by this permit shall not be reconstructed, relocated, or modified, unless a Permit to Install authorizing such action is issued by the Department, except to the extent such action is exempt from the Permit to Install requirements by any applicable rule. (R 336.1201(1))
- 2. If the installation, construction, reconstruction, relocation, or modification of the equipment for which this permit has been approved has not commenced within 18 months, or has been interrupted for 18 months, this permit shall become void unless otherwise authorized by the Department. Furthermore, the permittee or the designated authorized agent shall notify the Department via the Supervisor, Permit Section, Air Quality Division, Michigan Department of Environmental Quality, P.O. Box 30260, Lansing, Michigan 48909-7760, if it is decided not to pursue the installation, construction, reconstruction, relocation, or modification of the equipment allowed by this Permit to Install. (R 336.1201(4))
- 3. If this Permit to Install is issued for a process or process equipment located at a stationary source that is not subject to the Renewable Operating Permit program requirements pursuant to R 336.1210, operation of the process or process equipment is allowed by this permit if the equipment performs in accordance with the terms and conditions of this Permit to Install. (R 336.1201(6)(b))
- 4. The Department may, after notice and opportunity for a hearing, revoke this Permit to Install if evidence indicates the process or process equipment is not performing in accordance with the terms and conditions of this permit or is violating the Department's rules or the Clean Air Act. (R 336.1201(8), Section 5510 of Act 451, PA 1994)
- 5. The terms and conditions of this Permit to Install shall apply to any person or legal entity that now or hereafter owns or operates the process or process equipment at the location authorized by this Permit to Install. If the new owner or operator submits a written request to the Department pursuant to R 336.1219 and the Department approves the request, this permit will be amended to reflect the change of ownership or operational control. The request must include all of the information required by subrules (1)(a), (b), and (c) of R 336.1219 and shall be sent to the District Supervisor, Air Quality Division, Michigan Department of Environmental Quality. (R 336.1219)
- 6. Operation of this equipment shall not result in the emission of an air contaminant which causes injurious effects to human health or safety, animal life, plant life of significant economic value, or property, or which causes unreasonable interference with the comfortable enjoyment of life and property. (R 336.1901)
- 7. The permittee shall provide notice of an abnormal condition, start-up, shutdown, or malfunction that results in emissions of a hazardous or toxic air pollutant which continue for more than one hour in excess of any applicable standard or limitation, or emissions of any air contaminant continuing for more than two hours in excess of an applicable standard or limitation, as required in Rule 912, to the Department. The notice shall be provided not later than two business days after start-up, shutdown, or discovery of the abnormal condition or malfunction. Written reports, if required, must be filed with the Department within 10 days after the start-up or shutdown occurred, within 10 days after the abnormal conditions or malfunction has been corrected, or within 30 days of discovery of the abnormal condition or malfunction, whichever is first. The written reports shall include all of the information required in Rule 912(5). (R 336.1912)
- 8. Approval of this permit does not exempt the permittee from complying with any future applicable requirements which may be promulgated under Part 55 of 1994 PA 451, as amended or the Federal Clean Air Act.
- 9. Approval of this permit does not obviate the necessity of obtaining such permits or approvals from other units of government as required by law.
- 10. Operation of this equipment may be subject to other requirements of Part 55 of 1994 PA 451, as amended and the rules promulgated thereunder.

- 11. Except as provided in subrules (2) and (3) or unless the special conditions of the Permit to Install include an alternate opacity limit established pursuant to subrule (4) of R 336.1301, the permittee shall not cause or permit to be discharged into the outer air from a process or process equipment a visible emission of density greater than the most stringent of the following. The grading of visible emissions shall be determined in accordance with R 336.1303. (R 336.1301)
 - a) A six-minute average of 20 percent opacity, except for one six-minute average per hour of not more than 27 percent opacity.
 - b) A visible emission limit specified by an applicable federal new source performance standard.
 - c) A visible emission limit specified as a condition of this Permit to Install.
- 12. Collected air contaminants shall be removed as necessary to maintain the equipment at the required operating efficiency. The collection and disposal of air contaminants shall be performed in a manner so as to minimize the introduction of contaminants to the outer air. Transport of collected air contaminants in Priority I and II areas requires the use of material handling methods specified in R 336.1370(2). (R 336.1370)
- 13. The Department may require the permittee to conduct acceptable performance tests, at the permittee's expense, in accordance with R 336.2001 and R 336.2003, under any of the conditions listed in R 336.2001. (R 336.2001)

SPECIAL CONDITIONS

EMISSION UNIT SUMMARY TABLE

The descriptions provided below are for informational purposes and do not constitute enforceable conditions.

Emission Unit ID	Emission Unit Description (Process Equipment & Control Devices)	Flexible Group ID		
EU#1LINE	Equipment is used to clean and coat wire and to bake on the coating, and includes the following: 450-gallon caustic bath; Rise 1; 338-gallon nitric acid bath; Rinse 2; 380-gallon satin glide bath; air wipe; and dryer. Bath sizes are approximate.			
EU#4LINE	This emission unit makes stainless steel wire. It includes a nitric acid bath and an electric annealer, followed by branching lines. One branch includes two coating tanks (SS2 & SS3) and a gas dryer, and the other branch includes sulfuric acid, nickel, copper sulfate, and coating (SS2) baths and a dryer. Each dryer has a heat input capacity of 90,000 BTU/hr.	FGFACILITY		
EU#74LINE	This emission unit makes carbon and steel wire. The copper (west) section has caustic, hydrochloric acid, copper sulfate, and coating (741) tanks and a gas dryer. The copper free (east) section has two coating tanks (741 & 742), a cold cleaner (mineral spirits), and a gas dryer. Each dryer has a heat input capacity of 1.5 MMBTU/hr.	FGFACILITY		
EUGALVANIZER	Galvanizes wire, and includes the following: 700-gallon low-temperature lead bath; 700-gallon high-temperature lead bath; water curtain quench; water rinse; three hydrochloric acid baths, 400 gallons each (approximate concentrations 14%, 18%, and 20%); water rinse; 380-gallon flux bath; 4,000-gallon zinc bath; pad wipes; nitrogen wipes; quench tubes; 300-gallon Galfan flux bath; 1,200-gallon Galfan bath; nitrogen wipes; quench tubes; quench bath; and 300-gallon wax bath. Bath sizes are approximate.	FGFACILITY		
EUCLEANHOUSE-N	Equipment is used to clean carbon and stainless steel rod, and includes the following: 8,000-gallon hydrofluoric acid bath; 8,000-gallon sulfuric acid 2PIN bath; 12,000-gallon sulfuric acid 3PIN bath; spray rinse; dip rinse; activator bath; two 6,000-gallon zinc phosphate baths; dip rinse; 6,000-gallon borax bath; 6,000-gallon APEX (potassium sulfate) bath; 6,000-gallon lime bath; and dryer. Bath sizes are approximate.	FGFACILITY		
EUBOILER1	Cleaver Brooks Model CB428-400 natural gas-fired boiler used to generate steam, rated at 16.74 MMBTU/hr. The boiler originally was able to burn No. 6 fuel oil, but can no longer do so.	FGBOILERS, FGFACILITY		
EUBOILER2	Cleaver Brooks Model CB428-400 natural gas-fired boiler used to generate steam, rated at 16.74 MMBTU/hr. The boiler originally was able to burn No. 6 fuel oil, but can no longer do so.	FGBOILERS, FGFACILITY		
EUBOILER3	Cleaver Brooks Model CB428-400 natural gas-fired boiler used to generate steam, rated at 16.74 MMBTU/hr. The boiler originally was able to burn No. 6 fuel oil, but can no longer do so.	FGBOILERS, FGFACILITY		

Emission Unit ID	Emission Unit Description (Process Equipment & Control Devices)	Flexible Group ID		
EUHCLTANK31	5,000-gallon (approximate) hydrochloric acid (HCl) storage tank that receives shipments of 31% HCl. The tank exhausts through a wet scrubber.			
EUHCLTANK15	FGHCLTANKS, FGFACILITY			
"Cone machines" – not named individually	Each "cone machine" draws stainless steel wire down to very small diameters. The individual machines are exempt under R 336.1285(I)(i). This permit addresses them collectively to support the "opt-out."	FGCONEMACHINES, FGFACILITY		
EUGALVINIZER2 Galvanizes wire, and includes the following: 700-gallon low-temperature lead bath; 700-gallon high-temperature lead bath; water quench; 1200-gallon hydrochloric acid bath (approximate concentration 14% to 18%); water rinse; 380-gallon flux bath; 4,000-gallon zinc bath; gas gravel wipe utilizing hydrogen sulfide and propane; a second 380-gallon flux bath; nitrogen wipes; a second water quench; and 300-gallon wax bath. Bath sizes are approximate.		FGFACILITY		

Changes to the equipment described in this table are subject to the requirements of R 336.1201, except as allowed by R 336.1278 to R 336.1290.

The following conditions apply to: EU#1LINE

<u>DESCRIPTION</u>: Equipment is used to clean and coat wire and to bake on the coating, and includes the following: 450-gallon caustic bath; Rinse 1; 338-gallon nitric acid bath; Rinse 2; 380-gallon satin glide bath; air wipe; and dryer. Bath sizes are approximate.

Flexible Group ID: FGFACILITY

POLLUTION CONTROL EQUIPMENT: NA

I. <u>EMISSION LIMITS</u>

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
1. VOC	9.0 tpy	12-month rolling time period*	EU#1LINE	SC VI.1	R 336.1702(a)
12-month rolling time period as determined at the end of each calendar month					

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

NA

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

1. The permittee shall calculate the VOC emission rate from EU#1LINE monthly, for the preceding 12-month rolling time period, using a method acceptable to the AQD District Supervisor. The permittee shall keep all records on file at the facility and make them available to the Department upon request. (R 336.1702(a))

VII. REPORTING

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

Footnotes: ¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: EU#4LINE

<u>DESCRIPTION</u>: This emission unit makes stainless steel wire. It includes a nitric acid bath and an electric annealer, followed by branching lines. One branch includes two coating tanks (SS2 & SS3) and a gas dryer, and the other branch includes sulfuric acid, nickel, copper sulfate, and coating (SS2) baths and a dryer. Each dryer has a heat input capacity of 90,000 BTU/hr.

Flexible Group ID: FGFACILITY

POLLUTION CONTROL EQUIPMENT: NA

I. EMISSION LIMITS

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
1. Nitric acid	58.5 ppmv ¹	Test protocol	The nitric acid bath in EU#4LINE	GC 13	R 336.1901

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

NA

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VII. REPORTING

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV#4VENT	16 ¹	47.3 ¹	R 336.1901

IX. OTHER REQUIREMENTS

Footnotes: ¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: EU#74LINE

<u>DESCRIPTION</u>: This emission unit makes carbon and steel wire. The copper (west) section has caustic, hydrochloric acid, copper sulfate, and coating (741) tanks and a gas dryer. The copper free (east) section has two coating tanks (741 & 742), a cold cleaner (mineral spirits), and a gas dryer. Each dryer has a heat input capacity of 1.5 MMBTU/hr.

Flexible Group ID: FGFACILITY

POLLUTION CONTROL EQUIPMENT: Two wet scrubbers

I. <u>EMISSION LIMITS</u>

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
1. Hydrogen chloride (HCI)	0.05 lb/hr ¹	According to method	EU#74LINE	GC 13, SC IV.1	R 336.1225

2. The visible emission from EU#74LINE shall not exceed 0% opacity. (R 336.1301)

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

NA

IV. DESIGN/EQUIPMENT PARAMETERS

- 1. The permittee shall not operate EU#74LINE unless both scrubbers in EU#74LINE are installed, maintained, and operated in a satisfactory manner. (R 336.1224, R 336.1225, R 336.1910)
- 2. The permittee shall equip and maintain each scrubber in EU#74LINE with a liquid flow indicator. (R 336.1910)

V. <u>TESTING/SAMPLING</u>

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

1. The permittee shall monitor and record, in a satisfactory manner, the liquid flow rate for each scrubber in EU#74LINE each shift that EU#74LINE operates. (R 336.1910)

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
1. SV#74LINESCRUB1	20 ¹	35 ¹	R 336.1225
2. SV#74LINESCRUB2	20 ¹	35 ¹	R 336.1225

IX. OTHER REQUIREMENTS

NA

Footnotes:

¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: EUGALVANIZER

DESCRIPTION: Galvanizes wire, and includes the following: 700-gallon low-temperature lead bath; 700-gallon high-temperature lead bath; water curtain quench; water rinse; three hydrochloric acid baths, 400 gallons each (approximate concentrations 14%, 18%, and 20%); water rinse; 380-gallon flux bath; 4,000-gallon zinc bath; pad wipes; nitrogen wipes; quench tubes; 300-gallon Galfan flux bath; 1,200-gallon Galfan bath; nitrogen wipes; quench bath; and 300-gallon wax bath. Bath sizes are approximate.

Flexible Group ID: FGFACILITY

POLLUTION CONTROL EQUIPMENT: NA

I. EMISSION LIMITS

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
1. Hydrochloric acid (HCI) concentration in the bath	20% by weight ¹	According to method	Any HCI bath in EUGALVANIZER	SC VI.1	R 336.1224, R 336.1225

III. PROCESS/OPERATIONAL RESTRICTIONS

1. The temperature of any HCl bath in EUGALVANIZER shall not exceed a maximum of 70 degrees C.¹ (R 336.1224, R 336.1225)

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

- 1. The permittee shall monitor and record, in a satisfactory manner, the HCl concentration of each HCl bath in EUGALVANIZER each time the concentration is adjusted. (R 336.1224, R 336.1225)
- 2. The permittee shall monitor and record, in a satisfactory manner, the temperature of each HCl bath in EUGALVANIZER once each shift that the HCl bath is operated. (R 336.1224, R 336.1225)

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

NA

Footnotes:
¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: EUCLEANHOUSE-N

<u>DESCRIPTION</u>: Equipment is used to clean carbon and stainless steel rod, and includes the following: 8,000-gallon hydrofluoric acid bath; 8,000-gallon sulfuric acid 2PIN bath; 12,000-gallon sulfuric acid 3PIN bath; spray rinse; dip rinse; activator bath; two 6,000-gallon zinc phosphate baths; dip rinse; 6,000-gallon borax bath; 6,000-gallon APEX (potassium sulfate) bath; 6,000-gallon lime bath; and dryer. Bath sizes are approximate.

Flexible Group ID: FGFACILITY

POLLUTION CONTROL EQUIPMENT: Demister for the acid baths

I. <u>EMISSION LIMITS</u>

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
1. Hydrofluoric acid (HF)	Maximum concentration 10% by weight ¹	At any time	HF bath in EUCLEANHOUSE-N	SC VI.2	R 336.1224, R 336.1225

III. PROCESS/OPERATIONAL RESTRICTIONS

NA

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

- 1. The permittee shall monitor and record, in a satisfactory manner, the temperature of the sulfuric acid 2PIN bath and the temperature of the sulfuric acid 3PIN bath in EUCLEANHOUSE-N once each shift that each bath is operated. (R 336.1224, R 336.1225)
- 2. The permittee shall monitor and record, in a satisfactory manner, the HF concentration in the HF bath, the sulfuric acid concentration in the sulfuric acid 2PIN bath, and the sulfuric acid concentration in the sulfuric acid 3PIN bath in EUCLEANHOUSE-N each time the concentration is adjusted. (R 336.1224, R 336.1225)

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

NA

<u>Footnotes</u>:

This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: EUGALVANIZER2

<u>DESCRIPTION</u>: Galvanizes wire, and includes the following: 700-gallon low-temperature lead bath; 700-gallon high-temperature lead bath; water quench; 1200-gallon hydrochloric acid bath (approximate concentration 14% to 18%); water rinse; 380-gallon flux bath; 4,000-gallon zinc bath; gas gravel wipe utilizing hydrogen sulfide and propane; a second 380-gallon flux bath; nitrogen wipes; a second water quench; and 300-gallon wax bath. Bath sizes are approximate.

Flexible Group ID: FGFACILITY

POLLUTION CONTROL EQUIPMENT: NA

I. EMISSION LIMITS

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
1. Hydrochloric acid (HCI) concentration in the bath	18% by weight ¹	According to method	Any HCl bath in EUGALVANIZER2	SC VI.1	R 336.1224, R 336.1225

III. PROCESS/OPERATIONAL RESTRICTIONS

1. The temperature of any HCl bath in EUGALVANIZER2 shall not exceed a maximum of 140 degrees F.¹ (R 336.1224, R 336.1225)

IV. <u>DESIGN/EQUIPMENT PARAMETERS</u>

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

- 1. The permittee shall monitor and record, in a satisfactory manner, the HCl concentration of each HCl bath in EUGALVANIZER2 each time the concentration is adjusted. (R 336.1224, R 336.1225)
- 2. The permittee shall monitor and record, in a satisfactory manner, the temperature of each HCl bath in EUGALVANIZER2 once each shift that the HCl bath is operated. (R 336.1224, R 336.1225)

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

NA

Footnotes:
¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

FLEXIBLE GROUP SUMMARY TABLE

The descriptions provided below are for informational purposes and do not constitute enforceable conditions.

Flexible Group ID	Flexible Group Description	Associated Emission Unit IDs
FGBOILERS	Three Cleaver Brooks Model CB428-400 natural gas- fired boilers used to generate steam, each rated at 16.738 MMBTU/hr. The boilers originally were able to burn No. 6 fuel oil, but can no longer do so.	EUBOILER1, EUBOILER2, EUBOILER3
FGCONEMACHINES	The "cone machines" draw stainless steel wire down to very small diameters.	Not named individually
FGHCLTANKS	Hydrogen chloride storage tanks	EUHCLTANK31, EUHCLTANK15
FGFACILITY	All process equipment source-wide including equipment covered by other permits, grand-fathered equipment and exempt equipment.	All equipment at the facility

The following conditions apply to: FGBOILERS

<u>DESCRIPTION:</u> Three Cleaver Brooks Model CB428-400 natural gas-fired boilers used to generate steam, each rated at 16.74 MMBTU/hr. The boilers originally were able to burn No. 6 fuel oil, but can no longer do so.

Emission Units: EUBOILER1, EUBOILER2, EUBOILER3

POLLUTION CONTROL EQUIPMENT: NA

I. <u>EMISSION LIMITS</u>

Pollutant	Limit	Time Period/ Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

1. Applicant shall not operate more than two boilers at one time. (R 336.1205)

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VII. REPORTING

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

Footnotes: ¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: FGCONEMACHINES

<u>DESCRIPTION:</u> All "cone machines" at the facility. Each "cone machine" draws stainless steel wire down to very small diameters. The use of drawing compound results in VOC emissions.

Emission Units: The cone machines are not named individually, since individual machines are exempt under R 336.1285(I)(i).

POLLUTION CONTROL EQUIPMENT: NA

I. <u>EMISSION LIMITS</u>

Pollutant	Limit	Time Period/ Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements		
1. VOC	9.0 tpy	12-month rolling time period*	FGCONEMACHINES	SC VI.2	R 336.1205		
* 12-month rollin	12-month rolling time period as determined at the end of each calendar month						

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

NA

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

- 1. The permittee shall monitor and record, in a satisfactory manner, the amount of drawing compound used in FGCONEMACHINES, in gallons, and the VOC content of the drawing compound, in pounds per gallon, on a monthly basis. (R 336.1205)
- 2. The permittee shall calculate the VOC emission rate from FGCONEMACHINES monthly, for the preceding 12-month rolling time period, using a method acceptable to the AQD District Supervisor. The permittee shall keep all records on file at the facility and make them available to the Department upon request. (R 336.1205)

VII. REPORTING

NA

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

NA

<u>Footnotes</u>:

This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply to: FGHCLTANKS

<u>DESCRIPTION:</u> Hydrogen chloride storage tanks, each about 5,000 gallons capacity.

Emission Units: EUHCLTANK31, EUHCLTANK15

POLLUTION CONTROL EQUIPMENT: EUHCLTANK31 exhausts through a wet scrubber

I. EMISSION LIMITS

Pollutant	Limit	Time Period/ Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

NA

IV. DESIGN/EQUIPMENT PARAMETERS

NA

V. TESTING/SAMPLING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

- 1. The permittee shall monitor and record, in a satisfactory manner, the number of transfers of material to FGHCLTANKS on a monthly basis. (R 336.1224, R 336.1225)
- 2. The permittee shall keep, in a satisfactory manner, all monthly records of the number of transfers to FGHCLTANKS, as required by SC VI.1, on file at the facility and make them available to the Department upon request. (R 336.1224, R 336.1225)

VII. REPORTING

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

Footnotes: ¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).

The following conditions apply Source-Wide to: FGFACILITY

POLLUTION CONTROL EQUIPMENT:

I. EMISSION LIMITS

Pollutant	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements	
1. Each individual HAP	Less than 9 tpy	12-month rolling time period*	FGFACILITY	SC VI.1	R 336.1205	
2. All HAPs combined	Less than 22.5 tpy	12-month rolling time period*	FGFACILITY	SC VI.1	R 336.1205	
* 12-month rollin	12-month rolling time period as determined at the end of each calendar month					

II. MATERIAL LIMITS

Material	Limit	Time Period / Operating Scenario	Equipment	Testing / Monitoring Method	Underlying Applicable Requirements
NA	NA	NA	NA	NA	NA

III. PROCESS/OPERATIONAL RESTRICTIONS

1. The permittee shall store all cleaning solvents in closed containers when not in use, and shall capture all waste cleaning and purge solvents and shall store them in closed containers. The permittee shall dispose of all waste cleaning and purge solvents in an acceptable manner in compliance with all applicable state rules and federal regulations. (R 336.1205, R 336.1702(a))

IV. <u>DESIGN/EQUIPMENT PARAMETERS</u>

NA

V. <u>TESTING/SAMPLING</u>

Records shall be maintained on file for a period of five years. (R 336.1201(3))

NA

VI. MONITORING/RECORDKEEPING

Records shall be maintained on file for a period of five years. (R 336.1201(3))

1. The permittee shall calculate the individual HAP and combined HAPs emission rates from FGFACILITY monthly, for the preceding 12-month rolling time period, using a method acceptable to the AQD District Supervisor. The permittee shall keep all records on file at the facility and make them available to the Department upon request. (R 336.1205)

VII. REPORTING

VIII. STACK/VENT RESTRICTIONS

The exhaust gases from the stacks listed in the table below shall be discharged unobstructed vertically upwards to the ambient air unless otherwise noted:

Stack & Vent ID	Maximum Exhaust Diameter/Dimensions (inches)	Minimum Height Above Ground (feet)	Underlying Applicable Requirements
NA	NA	NA	NA

IX. OTHER REQUIREMENTS

Footnotes: ¹This condition is state only enforceable and was established pursuant to Rule 201(1)(b).